

Amendments to the Claims:

This listing of claims replaces all prior versions and listings of claims in the application:

Listing of Claims:

1-12. (Canceled)

13. (New) A method for generating a nucleic acid encoding a stabilized protein, the method comprising:

- (a) identifying a biologically active polypeptide as being susceptible to loss of activity over time;
- (b) providing the sequence of the polypeptide of (a);
- (c) identifying a first amino acid residue in the polypeptide, the residue being susceptible to deamidation;
- (d) identifying a second amino acid residue adjacent to the first residue; and
- (e) producing a recombinant nucleic acid molecule encoding a mutant polypeptide identical to the polypeptide of (a) except for an alteration selected from the group consisting of (i) a deletion of the second amino acid residue, (ii) a substitution of the second amino acid residue with a different type of residue, and (iii) an insertion of an additional residue between the first and second residues,

wherein the mutant polypeptide of (e) is less susceptible to loss of activity over time than is the polypeptide of (a).

14. (New) The method of claim 13, wherein the first amino acid is asparagine.

15. (New) The method of claim 13, wherein the second amino acid is glycine.

16. (New) The method of claim 13, wherein the second amino acid is located C-terminal to the first amino acid.

17. (New) A method for generating a stabilized protein, wherein the nucleic acid produced by the method of claim 13 is harbored on an expression vector and expressed in a host organism.

18. (New) A method for generating a nucleic acid encoding a stabilized antibody, the method comprising:

(a) identifying a first antibody susceptible to loss of antigen binding activity over time, wherein the antibody includes a first region that is a complementarity determining region (CDR) or a framework region (FR);

(b) identifying a first amino acid residue susceptible to deamidation within the first region;

(c) identifying a second amino acid residue adjacent to the first residue; and

(d) producing a recombinant nucleic acid molecule that encodes a second antibody, wherein the second antibody includes a second region that is identical to the first region except for an alteration selected from the group consisting of (i) a deletion of the second amino acid residue, (ii) a substitution of the second amino acid residue with a different type of residue, and (iii) an insertion of an additional residue between the first and second residues,

wherein the second antibody of (d) is less susceptible to loss of antigen binding activity over time than is the first antibody of (a).

19. (New) The method of claim 18, wherein the first amino acid is asparagine.

20. (New) The method of claim 18, wherein the second amino acid is glycine.

21. (New) The method of claim 18, wherein the second amino acid is located C-terminal to the first amino acid.

22. (New) The method of claim 18, wherein the second antibody is a humanized antibody.
23. (New) The method of claim 18, wherein the first region is CDR.
24. (New) The method of claim 23, wherein the CDR is CDR2.
25. (New) A method for generating a stabilized antibody, wherein the nucleic acid produced by the method of claim 18 is harbored on an expression vector and expressed in a host organism.
26. (New) An antibody produced by the method of claim 25.
27. (New) A pharmaceutical composition comprising the recombinant antibody of claim 26.
28. (New) The method of claim 25, further comprising the step of formulating the stabilized antibody into a pharmaceutical composition.
29. (New) The method of claim 18, further comprising:
 - (e) expressing the second antibody encoded by the recombinant nucleic acid of (d); and
 - (f) comparing the antigen binding activity of the first antibody of (a) with the antigen binding activity of the altered second antibody of (e).
30. (New) The method of claim 29, further comprising:
 - (g) comparing the stability over time of the first antibody of (a) to the stability of the altered second antibody of (e).

31. (New) The method of claim 18, further comprising:
- (e) expressing the second antibody encoded by the recombinant nucleic acid of (d); and
 - (f) comparing the stability over time of the first antibody of (a) to the stability of the altered second antibody of (e).